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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/758,598	01/16/2004	Ryuji Nishikawa	606402016100	5396

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EXAMINER	
LIN, JAMES	

ART UNIT	PAPER NUMBER
1792	

MAIL DATE	DELIVERY MODE
10/31/2007	PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No.	Applicant(s)	
	10/758,598	NISHIKAWA ET AL.	
	Examiner	Art Unit	
	Jimmy Lin	1792	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *25 September 2007*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-6* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-6* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

> A person shall be entitled to a patent unless –
>
> (b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

2. Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by Nagayama (U.S. Patent No. 6,590,335).

Nagayama discloses a method of repairing an electroluminescent (EL) display with the irradiation of a laser. The EL display comprises an EL layer formed between an anode and a cathode (Fig. 1). A particle 20 on the EL display causes a defect. The defect is detected by means of visual inspection using a microscope or the like, and then laser irradiation is performed (col. 5, lines 30-67). The laser removes part of the electrode layer 104 around the particle (Fig. 2C-2D). The laser irradiation only removes part of the electrode layer and does not remove the particle (i.e., the laser beam is not directly incident on the detected foreign substance).

The limitation of "a high resistivity region" is a relative term and has been given little patentable weight. Accordingly, Nagayama teaches that a region having resistivity is formed between the anode and the cathode.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

4. Claims 2 and 5-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nagayama '335.

Nagayama is discussed above, but does not explicitly teach that the laser beam irradiation is repeated a plurality of times. However, one of ordinary skill in the art would have expected similar results using multiple steps of laser beam irradiation to repair the EL element defect as compared to only using one laser beam irradiation step. Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to have irradiated the EL element defect a plurality of times with a reasonable expectation of success in order to repair the EL element.

Claims 5-6: The laser removes the electrode surrounding the foreign particle and would have necessarily removed part of the electrode that is at a distance between 5 μm and 10 μm.

5. Claims 3-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nagayama '335 in view of Gee et al. (U.S. Patent No. 4,624,736).

Nagayama is discussed above, but does not explicitly teach that the laser beam wavelength can be 532 nm or lower. Nagayama does teach that the laser is used to remove part of the electrode, wherein the electrode can be made of aluminum (col. 5, lines 17-19). Accordingly, Gee teaches a method of etching an aluminum substrate via a laser operating at a wavelength of 248 nm (Example 1). It would have been obvious to one of ordinary skill in the art at the time of invention to have used a 248 nm wavelength laser as taught by Gee to remove part of the aluminum electrode of Nagayama with a reasonable expectation of success because Gee teaches that such a laser is operable for etching aluminum. The selection of something based on its known suitability for its intended use has been held to support a prima facie case of obviousness. Sinclair & Carroll Co. v. Interchemical Corp., 325 U.S. 327, 65 USPQ 297 (1945).

6. Claims 5-6 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nagayama '335 in view of Kodama (JP 2000-195677).

Nagayama is discussed above, but does not explicitly teach that the irradiated region of the display panel is 5 μm to 10 μm away from the foreign object. However, Kodama teaches a method of detecting and repairing a defect in an EL display via a laser irradiation method [0081]. The luminescence around the repaired portion will slowly degrade and diminish such that the entire pixel may become non-luminescent with time [0081]-[0082]. Thus, the irradiated region can be beyond the immediate area of the foreign substance as long as the irradiated region is

within a single pixel, since the entire pixel will eventually become non-luminescent anyway. It would have been obvious to one of ordinary skill in the art at the time of invention to have irradiated any portion of the EL element around the foreign substance within a single pixel, including the claimed distance away from the foreign substance, with a reasonable expectation of success in order to have further prevented a short-circuit.

Conclusion

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Asai (JP 2003-178871) teaches a method of repairing a defective portion of an organic EL layer (abstract; [0008]).

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jimmy Lin whose telephone number is 571-272-8902. The examiner can normally be reached on Monday thru Friday 8AM - 5:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tim Meeks can be reached on 571-272-1423. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

JL

JL

FRED J. PARKER
PRIMARY EXAMINER